

*2-Way Memo*

Subject: **Floor Load Analysis**  
**Headquarters**

**INSTRUCTIONS**

Use routing symbols whenever possible.

**SENDER (Originator of message):**

Use brief, informal language.

Conserve space.

Forward original and one copy.

**RECEIVER (Replier to message):**

Reply below the message, keep one copy, return one copy.

STAT To

[Redacted]  
 1118 Headquarters Building

DATE OF MESSAGE

ROUTING SYMBOL

7-18-84

SIGNATURE OF ORIGINATOR

STAT

C/FEB/RECD/OL

FOLD.

As per your office's request, Field Engineering Branch Engineers have reviewed the proposed floor loading and have determined that the load bearing capacity of the floor will not be exceeded if the following steps are followed:

1. The power files may not be in any other position than that shown in the attached drawing.
2. Existing shelving and literature must be removed to another room.
3. Filing shelf stops must be installed at location shown on the attached drawing.
4. Additional shelving shall not be installed without additional load bearing calculations.

STAT

Project Engineer: [Redacted]

From :

DATE OF REPLY

ROUTING SYMBOL

SIGNATURE OF REPLIER

DATE OF REPLY

~~CONFIDENTIAL~~

Approved For Release 2005/08/16 : CIA-RDP86-01019R000200050004-5

☒ UNCLASSIFIED

☐ SECRET

REQUEST FOR LOGISTICS SERVICES

MEMORANDUM FOR: CHIEF, LOGISTICS SERVICES DIVISION/OFFICE OF LOGISTICS

ATTENTION :

Service Requested:

Floor loading survey for both [redacted] East Asia Division. [redacted] would like to swing a Lektriever Series 80 power file from its present position so that it is on a line with the existing files. (See attached plan.) [redacted] would like to relocate three power files along the corridor wall in its present vault and move three other existing power files back two-three feet. The branch would also like to remove existing files from present vault walls and install a tracked moveable file system. (See attached plan.)

These plans will all be affected by the load bearing capacity of the floor.

Attachment

☒ Yes

☐ No

Deadline Date, if applicable

19 MAY 84

Justification:

Proposed plans will be affected by the load bearing capacity of the floor. (Other construction will also take place in the vault in conjunction with the installation of SAFE equipment.)

| COMP     | ACT | INFO |
|----------|-----|------|
| 1. SMART |     |      |
| 2. ADS   |     |      |
| 3. IF9   |     |      |
| 4. BSB   |     |      |
| 5. M&CB  |     |      |
| 6. MPB   |     |      |
| 7. EDRD  |     |      |

Special Considerations, if any:

Location where work is to be performed (room no. & 1H18, Hqs.

Date of Request

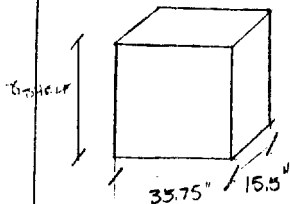
30 April 1984

Requesting Official

#1

$$35\frac{3}{4} \frac{\text{F.I.}}{\text{SHELF}} \times 8 \text{ SHELF} \times 2.95 \frac{\text{lb}}{\text{F.I.}} = 843.7 \text{ lb/SECTION}$$

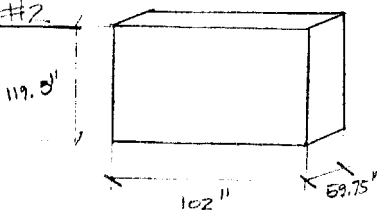
$$\frac{60}{903.7} \text{ lb. CABINET} = 0.066 \text{ lb TOTAL}$$



$$\frac{843.7 \text{ lb}}{35.75' \times 15.5"} = 1.63 \frac{\text{lb}}{\text{S.I.}} *$$

$$4 = 6.514.8 \text{ lb}$$

#2



$$3605 \text{ lb. UNLOADED}$$

$$2000 \text{ lb. W/ MEDIA}$$

$$5605 \text{ lb. TOTAL}$$

$$\frac{5605 \text{ lb}}{102' \times 59.75"} = .92 \frac{\text{lb}}{\text{S.I.}} *$$

$$2 = 1.840$$

#6

$$6 \text{ SHELF} \times 12 \frac{\text{F.I.}}{\text{SHELF}} \times 2.95 \frac{\text{lb}}{\text{F.I.}} = 743.4 \text{ lb}$$

$$+ 30 \text{ lb}$$

$$823.4 \text{ lb}$$

$$\frac{823.4 \text{ lb}}{42' \times 15.5"} = 1.26 \frac{\text{lb}}{\text{F.I.}} *$$

$$3 = .587,2$$

#5

$$2 \times 7 \text{ SHELF} \times 36 \frac{\text{F.I.}}{\text{SHELF}} \times 2.95 \frac{\text{lb}}{\text{F.I.}} = 1436.3 \text{ lb}$$

$$+ 90 \text{ lb}$$

$$1576.3 \text{ lb}$$

$$\frac{1576 \text{ lb}}{30' \times 36"} = 1.46 \frac{\text{lb}}{\text{S.I.}} *$$

$$7 \text{ IN AREA} \times 2 = 1037.6$$

\* THIS IS THE TOTAL LOAD ON IT DOES NOT INCLUDE THE WEIGHT OF THE SHELF

ALLOWABLE LIVE LOAD:

1.04 lb/S.I.  
150 lb/FT<sup>2</sup>  
.15 KIPS/FT<sup>2</sup>

MAX LOAD PER BAY (20x20):

60,000 lb  
60 KIPS

LOAD ANALYSIS BY BAYS:

| FLOOR SECTION | WALL LOAD (lb)            | SHELF LOAD (lb) | POWER FILE (lb) | MISC. (lb) | TOTAL LOAD (lb) | MAX ALL. LOAD (lb) |
|---------------|---------------------------|-----------------|-----------------|------------|-----------------|--------------------|
| 1             | 1800<br>(60 LFX 30 lb/ft) | 3614.8          | 11210           |            | 16624.8         | 60000              |
| 2             | 1200<br>40 x 30           | 16813.4         | 10642.6         |            | 33456.6         | 60000              |
| 3             | 1560<br>52 x 30           | 4513.5          | 10335.4         |            | 16413.9         | 60000              |
| 4             | 1710<br>57 x 30           | 4513.5          | 11210.0         |            | 17433.5         | 60000              |

## CONCLUSION:

ROOM 1113 IS STRUCTURALLY CAPABLE OF HOLDING THE PROPOSED LOADING. IF THE ROOM IS LAYED OUT IN ACCORDANCE WITH THE ENCLOSED DRAWING.

- NOTES:
1. IN MOVING THE SPECRY RAND POWER FILES, THERE SHOULD NOT BE MORE THAN 2 FILES IN A BAY AT ONE TIME
  2. EXISTING SHELVING MUST BE RE-LOCATED IN ANOTHER ROOM DURING AND AFTER MOVING PROCESS.